

# TADROS AWAD

MECHANICAL & BIM ENGINEER

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## Education

### Bachelor's Degree in Mechanical Power Engineering

Faculty of Engineering,  
Shoubra, Benha  
University, Egypt  
2014- 2019

## Certification

- **Certified HVAC Designer (CHD)**  
*ASHRAE – [May 2025]*

## Interests

- Swimming
- Chess
- Fantasy Premier League
- Hiking

## Summary

**Certified HVAC Designer (CHD)** with 6+ years of hands-on experience in HVAC design and BIM across industrial, residential, commercial, and data-center projects. Expert in delivering high-LOD Revit models, preparing coordinated shop drawings, performing energy audits, and applying value engineering to optimize performance and cost.

## Career history

**Lead HVAC Design Engineer** at Elite Consolidated Engineers: ECE  
June 2024 – PRESENT

- **Design & Development:** Lead the design and development of advanced HVAC systems for industrial, healthcare, and data center projects.
- **Site Supervision:** Conduct site visits to ensure design accuracy and adherence to quality standards.
- **BIM Modeling:** Develop detailed 3D mechanical models in Revit.

**Key Achievements:** Delivered comprehensive detailed design, Revit models and HVAC retrofit designs for major industrial and data center projects, including the Almarie Lambo facility in Riyadh, Elsewedy Industrial Factory in Dammam, SCCT Admin Buildings, and a Tanzanian data center; implemented system upgrades for leading clients such as Coca-Cola, PepsiCo, ChipcyCo, and Mondelez.

**HVAC & BIM ENGINEER** at GRFN-EG

June 2023 – June 2024

- Designed HVAC systems and mechanical layouts using BIM best practices; maintained and enforced BIM templates and standards.
- Performed energy audits and recommended efficiency improvements to reduce operating costs.
- Coordinated models and documentation for international and high-profile projects.

**Key achievements:** Reviewed and improved HVAC/BIM for Avenues Bahrain Mall; completed energy audit work for Sofitel Cairo Nile El Gezirah; developed coordinated mechanical BIM model for a DCP plant in NEOM.

## Key skills

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- Revit
- Revit family creation
- Navisworks
- Dynamo BIM
- AutoCAD
- HAP
- Duct/pipe sizer
- Solid works
- Microsoft Office
- ASHRAE

## References

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Available upon request

### **BIM Mechanical Engineer** at Rowad Modern Engineering

Nov. 2022 – May 2023

- Reviewed IFC mechanical models and executed clash coordination across disciplines.
- Upgraded models to LOD 400 and prepared coordinated mechanical shop drawings for construction.
- Managed project materials and ensured adherence to delivery timelines.

**Key achievements:** Delivered full value-engineering for a project cluster within one month; produced a coordinated Revit model for an underground piping system.

### **HVAC & BIM ENGINEER** at MAAP Electro-Mechanical Engineers

Aug. 2021 – Oct. 2022

- Designed HVAC systems and created 3D Revit models for new construction and renovation projects.
- Performed clash detection, customized Revit families, and produced LOD 500 documentation for renovation works.
- Prepared mechanical shop drawings and supported on-site reviews.

**Key achievements:** Delivered HVAC designs and BIM for *I Park* and *Jaya Complex*; upgraded models for *KFSH* renovations; completed mechanical shop drawings for *New Giza University Phase 2*.

### **SITE MECHANICAL ENGINEER** at Encorp International

Jul. 2019 – Aug. 2020

- Reviewed technical designs and supervised subcontractor execution on mechanical works.
- Ensured installation quality for chilled water, firefighting and other HVAC plant systems.
- Coordinated with consultant engineers for approvals and final inspections.

**Key achievements:** Delivered firefighting network works for the Egyptian Civil Defense; implemented chilled water systems to meet specified performance criteria; supervised mechanical execution for the *Octagon Project*.